

**Before the  
National Telecommunications and Information Administration  
Washington, D.C. 20230**

In the Matter of	)	
	)	
Implementation of the	)	88 Fed. Reg. 85266
National Spectrum Strategy	)	
	)	

**COMMENTS OF COMCAST CORPORATION**

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**COMMENTS OF COMCAST CORPORATION**

Comcast Corporation (“Comcast”) submits these comments in response to the National Telecommunications and Information Administration’s (“NTIA”) Notice of Opportunity for Public Input on the Implementation Plan for the National Spectrum Strategy (“NSS” or “Strategy”).<sup>1</sup> Comcast commends NTIA for releasing the Strategy in a timely manner and appreciates the opportunity to provide input on its implementation. As the Strategy itself acknowledges, it is “only the beginning” and the Implementation Plan is the important next step to ensure there is sufficient spectrum to maintain U.S. leadership in wireless technologies, particularly next-generation coexistence mechanisms.<sup>2</sup> These steps are critical to promoting U.S. economic and national security interests and maintaining U.S. spectrum leadership on a global scale. Comcast welcomes the opportunity to assist NTIA and other federal agencies in executing on the Strategy and the Implementation Plan.

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<sup>1</sup> See Nat’l Telecomms. & Info. Admin., Implementation of the National Spectrum Strategy, Notice of Opportunity for Public Input, 88 Fed. Reg. 85266 (Dec. 7, 2023); *National Spectrum Strategy*, White House (Nov. 13, 2023), [https://www.ntia.gov/sites/default/files/publications/national\\_spectrum\\_strategy\\_final.pdf](https://www.ntia.gov/sites/default/files/publications/national_spectrum_strategy_final.pdf) (“NSS” or “Strategy”).

<sup>2</sup> NSS at 22.

## INTRODUCTION AND SUMMARY

As the Biden administration (“Administration”) and NTIA underscore, radiofrequency spectrum “is among our Nation’s most important national resources.”<sup>3</sup> Spectrum resources are critical to promoting private-sector innovation and furthering the missions of our federal agencies, and the Strategy and Implementation Plan are more important than ever because the existing reserve of radiofrequency spectrum cannot keep pace with demand.

As NTIA is well aware, the risks of a congested spectrum environment to commercial operations are not merely hypothetical. NTIA aptly recognizes that “[n]ext generation wireless technologies such as 5G, 6G, and Wi-Fi necessitate additional spectrum resources with the capacity for wider channels[.]”<sup>4</sup> Moreover, approximately 80% of data consumed on mobile phones is offloaded from mobile cell networks to Wi-Fi networks<sup>5</sup> – and that number is even higher – approximately 90 percent – for Xfinity Mobile data traffic passing over Xfinity WiFi. Large-scale IoT deployments and other advanced technological developments have already been hampered by the risk of congestion.<sup>6</sup> Federal operators have faced similar challenges. As the Department of Defense (“DoD”) notes, “[t]he rise of mobile systems and digital technology across the globe has placed enormous strain on the available spectrum for DoD’s command,

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<sup>3</sup> *Memorandum on Modernizing United States Spectrum Policy and Establishing a National Spectrum Strategy*, White House (Nov. 13, 2023), <https://www.whitehouse.gov/briefing-room/presidential-actions/2023/11/13/memorandum-on-modernizing-united-states-spectrum-policy-and-establishing-a-national-spectrum-strategy/>; NSS at ii, 1 (noting that President “has called radio frequency spectrum one of ‘our Nation’s most important national resources’” and explaining that “[r]adio frequency spectrum plays a significant—but often unacknowledged—role in Americans’ daily lives”).

<sup>4</sup> NSS at 4.

<sup>5</sup> See *Broadband Stats: A World of Wi-Fi*, NCTA (June 22, 2023), <https://www.ncta.com/whats-new/broadband-stats-a-world-of-wi-fi>.

<sup>6</sup> See Raul Katz, *Assessing the Economic Value of Unlicensed Use in the 5.9 GHz & 6 GHz Bands*, WiFiForward, at 9 (Apr. 2020), <https://wififorward.org/wp-content/uploads/2020/04/5.9-6.0-FINAL-for-distribution.pdf>.

control, and communications needs.”<sup>7</sup> Additional spectrum is critical to preserving the integrity of defense operations, and to the U.S. economy and the American public. We cannot afford any further risk of delay in expanding spectrum access.

Comcast fully agrees with the Strategy that identifying a sufficient spectrum pipeline is necessary to ensure U.S. leadership in advanced technologies and economic growth and that “[d]ynamic spectrum sharing is one key to meet these growing [spectrum] demands.”<sup>8</sup>

Greenfield spectrum is essentially nonexistent, and new coexistence frameworks and dynamic sharing technologies are the solution to unlocking additional spectrum needed to advance U.S. commercial and federal interests in an increasingly congested spectrum environment.

Coexistence – through both shared-licensed and unlicensed models – makes additional capacity available in underutilized spectrum bands, which “offers increased access to both federal and non-federal users.”<sup>9</sup> This increased access to spectrum for a variety of users and use cases promotes competition, which in turn facilitates the introduction of new spectrum-based technologies and innovation.<sup>10</sup> Meanwhile, coexistence techniques have proven successful in maintaining important incumbent federal military operations that are important to our national security and support the innovation needed to compete with our global peers.<sup>11</sup> Coexistence

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<sup>7</sup> Press Release, Department of Defense, Electromagnetic Spectrum Superiority Strategy Released (Oct. 29, 2020), <https://www.defense.gov/News/Releases/Release/Article/2397850/electromagnetic-spectrum-superiority-strategy-released/>.

<sup>8</sup> NSS at 1.

<sup>9</sup> *Why Sharing is the Answer to Rising Demand for Spectrum*, NTIA, <https://www.ntia.gov/blog/why-sharing-answer-rising-demand-spectrum>.

<sup>10</sup> See, e.g., Comments of NCTA—The Internet & Television Association, AT&T Petition for Rulemaking to Establish a Mid-Band Spectrum Screen and Mobile Spectrum Holdings Policies, WT Docket No. 23-319, at 3 (Oct. 23, 2023).

<sup>11</sup> See *Electromagnetic Spectrum Superiority Strategy*, Department of Defense (Oct. 2020) (“2020 EMS Strategy”), [https://media.defense.gov/2020/Oct/29/2002525927/-1/-1/0/ELECTROMAGNETIC\\_SPECTRUM\\_SUPERIORITY\\_STRATEGY.PDF](https://media.defense.gov/2020/Oct/29/2002525927/-1/-1/0/ELECTROMAGNETIC_SPECTRUM_SUPERIORITY_STRATEGY.PDF).

frameworks offer a solution to sharing limited existing spectrum between commercial and federal users, and DoD has further recognized dynamic spectrum sharing as necessary to facilitate the rapid flow of data used for artificial intelligence and other military applications.<sup>12</sup> Continued investment in coexistence methodologies is vital for the United States to continue to lead and compete on a global scale, and NTIA should leverage these modern spectrum frameworks to the greatest extent feasible as it implements the Strategy.

Comcast also commends the Strategy for identifying the 3.1-3.45 GHz (“Lower 3 GHz”), 7125-8400 MHz (“7/8 GHz”), and 37.0-37.6 GHz (“Lower 37 GHz”) bands as part of this spectrum pipeline for expanded governmental and non-governmental use in the near term. Although the Strategy identifies these three priority bands as “meriting in-depth study in the near term,”<sup>13</sup> the Implementation Plan should leverage existing studies and review of these bands and coordinate with the Federal Communications Commission (“FCC”) to take prompt action in making these bands available for commercial use via a coexistence framework. NTIA should further ensure that its Implementation Plan will actually advance the Strategy and expedite action on the Lower 3 GHz, 7/8 GHz, and Lower 37 GHz bands by promoting efficient review of the bands with sufficient agency resources and by establishing detailed, clear timelines and deadlines.

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<sup>12</sup> See Billy Mitchell, *The Importance of Spectrum Sharing to the Future of War*, FedScoop (Apr. 11, 2022), <https://fedscoop.com/the-importance-of-spectrum-sharing-to-the-future-of-war/>.

<sup>13</sup> NSS at 6.

**I. THE IMPLEMENTATION PLAN SHOULD LEVERAGE EXISTING STUDIES AND STAKEHOLDER INPUT, AND DIRECT NTIA AND THE FCC TO TAKE PROMPT ACTION ON THE LOWER 3 GHZ, 7/8 GHZ, AND LOWER 37 GHZ BANDS.**

The Lower 3 GHz, 7/8 GHz, and Lower 37 GHz bands are three of five spectrum bands identified in the Strategy for “in-depth study in the near term” in order “to determine whether they may be repurposed for expanded or more efficient uses.”<sup>14</sup> As NTIA moves to an Implementation Plan and outlines next steps on these bands, however, it is not starting from zero. Each of these bands has been subject to extensive study and stakeholder input, and the Implementation Plan must leverage the work that has already been done to make these bands available for commercial use via coexistence approaches as soon as possible. As the Strategy notes, “maintaining U.S. spectrum leadership often requires bold and decisive action[.]”<sup>15</sup> and NTIA must “not let the desire for more perfect information take precedence over this critical national interest.”<sup>16</sup>

**A. NTIA Should Make the Lower 3 GHz Band Available for Commercial Use Through a Coexistence Framework as Soon as Possible.**

The Lower 3 GHz band has been extensively studied for several years, and DoD recently concluded that sharing in the band is feasible. Any further study as part of the Implementation Plan should therefore be expedited and targeted to further refinements on implementing a coexistence framework.

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<sup>14</sup> *Id.*

<sup>15</sup> *Id.* at 3 (“[W]e must also take immediate action to meet existing and reasonably anticipated near- and mid-term spectrum needs.”).

<sup>16</sup> *Id.*

NTIA first identified the 3.1-3.5 GHz segment for potential repurposing in 2010.<sup>17</sup> NTIA then undertook further evaluations of the band in 2018, consistent with the White House’s directive to evaluate “spectrum-sharing tools and techniques that increase spectrum access, efficiency, and effectiveness[,]”<sup>18</sup> and Congress’s directive for NTIA to study the 3.1-3.55 GHz band specifically for potential repurposing.<sup>19</sup> In 2019, NTIA released a Public Notice seeking stakeholder input on these frequencies and conducted a series of technical studies thereafter.<sup>20</sup> In 2020, NTIA released a feasibility report, concluding that sharing below 3.45 GHz is possible subject to some further review.<sup>21</sup>

The years of review and input then culminated in the DoD, pursuant to the Infrastructure Investment and Jobs Act, developing a report to Congress on the Lower 3 GHz band. Over the past nearly two years, DoD has worked closely with NTIA and stakeholders through the “Partnering to Advance Trusted and Holistic Spectrum Solutions” (“PATHSS”) Working Group to analyze how the band can be made available for shared use.<sup>22</sup> DoD completed its “Emerging

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<sup>17</sup> See *Plan and Timetable to Make Available 500 Megahertz of Spectrum for Wireless Broadband*, NTIA (Oct. 2010), [https://www.ntia.doc.gov/files/ntia/publications/tenyearplan\\_11152010.pdf](https://www.ntia.doc.gov/files/ntia/publications/tenyearplan_11152010.pdf).

<sup>18</sup> *Presidential Memorandum on Developing a Sustainable Spectrum Strategy for America’s Future*, White House (Oct. 25, 2018), <https://trumpwhitehouse.archives.gov/presidential-actions/presidential-memorandum-developing-sustainable-spectrum-strategy-americas-future/> (“2018 Presidential Memorandum”).

<sup>19</sup> See MOBILE NOW Act, Division P, Title VI of the Consolidated Appropriations Act of 2018, Pub. L. No. 115-141, 132 Stat. 348, 1100 (Mar. 23, 2018), <https://www.govinfo.gov/content/pkg/PLAW-115publ141/pdf/PLAW-115publ141.pdf>.

<sup>20</sup> See Memorandum from Diane Rinaldo, Assistant Secretary of Commerce for Communications & Information, U.S. Dep’t of Commerce, NTIA to Executive Branch Departments & Agencies, *Review of Current Frequency Assignments and Quantification of Spectrum Usage* (Aug. 1, 2019), [https://www.ntia.gov/sites/default/files/publications/guidance\\_to\\_agencies\\_on\\_current\\_spectrum\\_usage\\_final\\_08-01-2019\\_0.pdf](https://www.ntia.gov/sites/default/files/publications/guidance_to_agencies_on_current_spectrum_usage_final_08-01-2019_0.pdf) (“NTIA Aug. 1, 2019 Memorandum”).

<sup>21</sup> See *Feasibility of Commercial Wireless Services Sharing with Federal Operations in the 3100-3550 MHz Band*, NTIA (July 2020), [https://www.ntia.doc.gov/files/ntia/publications/ntia\\_3100-3550\\_mhz\\_mobile\\_now\\_report\\_to\\_congress.pdf](https://www.ntia.doc.gov/files/ntia/publications/ntia_3100-3550_mhz_mobile_now_report_to_congress.pdf).

<sup>22</sup> See Testimony of James Assey, Executive Vice President, NCTA—The Internet & Television Association, U.S. House of Representatives, at 7-8 (Mar. 10, 2023), <https://www.ncta.com/sites/default/files/2023-03/NCTA%20Testimony%20for%20March%2010%202023%20Spectrum%20Hearing.pdf>.

Mid-Band Radar Spectrum Sharing” Feasibility Assessment (“EMBRSS Report”), which reflects 20 months of research and the consensus of military services and defense stakeholders, interagency partners, industry, and academia.<sup>23</sup> As the Strategy points out, the Report concluded that “sharing is feasible if certain advanced interference-mitigation features and a coordination framework to facilitate spectrum sharing are put in place.”<sup>24</sup> The Strategy proposes “follow-on” studies to the EMBRSS Report to explore “dynamic spectrum sharing and other opportunities for private-sector access in the band, while ensuring DoD and other Federal mission capabilities are preserved[.]”<sup>25</sup>

Given that the final EMBRSS Report has not yet been publicly released, it remains to be seen precisely what further study is necessary to make the band available for commercial use. However, any further inquiry outlined in the Implementation Plan should be targeted “follow-ons” to the Report that build upon DoD’s conclusion about the feasibility of coexistence with commercial services in the Lower 3 GHz band. Coexistence models offer enormous promise in the Lower 3 GHz band, particularly given the presence of incumbent federal users. For instance, military officials estimate that it would cost up to \$120 billion to move DoD radar operations out of the Lower 3 GHz band to free it up for exclusive commercial 5G operations.<sup>26</sup> Analysts have predicted that it is unlikely an auction would generate the necessary \$120 billion needed to pay

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<sup>23</sup> See Press Release, U.S. Dep’t of Defense, Joint Statement from Department of Defense Chief Information Officer John Sherman and Assistant Secretary of Commerce Alan Davidson on the Emerging Mid-Band Radar Spectrum Sharing (EMBRSS) Feasibility Assessment (Sept. 28, 2023), <https://www.defense.gov/News/Releases/Release/Article/3541300/joint-statement-from-department-of-defense-chief-information-officer-john-sherm/>.

<sup>24</sup> NSS at 6.

<sup>25</sup> *Id.*

<sup>26</sup> See Theresa Hitchens, *STRATCOM Wrapping Spectrum Ops Center Plan, as Military Faces Bandwidth Grab by 5G Firms*, Breaking Defense (Mar. 9, 2023), <https://breakingdefense.com/2023/03/stratcom-wrapping-spectrum-ops-center-plan-as-military-faces-bandwidth-grab-by-5g-firms/>; see also Mike Dano, *NTIA Delivers Ammunition to Spectrum Sharing Advocates*, LightReading (May 2, 2023), <https://www.lightreading.com/5g/ntia-delivers-ammunition-to-spectrum-sharing-advocates>.

for U.S. military radars to be moved to another band, particularly in the midst of “significant cost-cutting efforts” by 5G providers.<sup>27</sup> In addition to avoiding costly clearing, coexistence avoids the time-intensive and highly disruptive reallocation process often involved in an exclusive-licensed model, thus making spectrum available for commercial use more quickly, while ensuring that DoD and other federal users have sufficient spectrum to maintain operations for U.S. national security. Recent studies have further demonstrated the “clear financial benefits” of coexistence and shared spectrum licensing over exclusive-use models.<sup>28</sup>

Real-world deployments also have proven that coexistence models can effectively preserve federal operations, while facilitating commercial deployments. A recent NTIA report on the Citizens Broadband Radio Service (“CBRS”) band found that the number of CBRS devices grew by 121 percent over a 21-month period,<sup>29</sup> and 45 percent of all active CBRS devices were deployed in counties where use of the spectrum is shared with DoD.<sup>30</sup> No interference issues have been reported, and NTIA has further concluded that “[t]he success and growth of the CBRS band shows the promise of dynamic spectrum sharing to make more efficient use of this finite resource.”<sup>31</sup> The CBRS model provides a useful archetype for which to enable a coexistence framework in the Lower 3 GHz band, and NTIA should build on this success by acting promptly on the Lower 3 GHz band, while leveraging this approach.

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<sup>27</sup> Dano, *supra* note 28.

<sup>28</sup> Coleman Bazelon, et al., *Principles of Spectrum Sharing: Understanding the Value of Shared Spectrum*, The Brattle Group (Sept. 18, 2023), <https://spectrumfuture.com/wp-content/uploads/2023/09/Principles-of-Spectrum-Sharing-Understanding-the-Value-of-Shared-Spectrum.pdf>.

<sup>29</sup> See Douglas Boulware, et al., *An Analysis of Aggregate CBRS SAS Data from April 2021 to January 2023*, NTIA Report 23-567, NTIA, at 6 (May 2023), <https://its.ntia.gov/umbraco/surface/download/publication?reportNumber=TR-23-567.pdf> (“ITS Report”).

<sup>30</sup> See ITS Report at 50; see also *The Innovative Spectrum Sharing Framework Connecting Americans Across the Country*, NTIA (Aug. 14, 2023), <https://www.ntia.gov/blog/2023/innovative-spectrum-sharing-framework-connecting-americans-across-country> (“NTIA Aug. 14, 2023 Blog”).

<sup>31</sup> NTIA Aug. 14, 2023 Blog.

Any further study also must continue to consider input from interested stakeholders and be conducted in a transparent manner. The Strategy commits to “build[ing] upon existing constructs to enable consistent, robust, and transparent engagement among stakeholders[,]”<sup>32</sup> and the PATHSS Working Group provides an exemplary model by which to productively engage interested stakeholders. NTIA should further build on this approach as part of the Implementation Plan for the Lower 3 GHz band.

**B. NTIA and the FCC Should Act Quickly on the 7/8 GHz Band.**

The Implementation Plan should direct the FCC to immediately open the Lower 7 GHz band (7125-7250 MHz) for unlicensed use, and NTIA should study making the remainder of the 7/8 GHz band available on a coexistence basis for unlicensed and shared-licensed use on an expedited timeframe. The 7/8 GHz band has been under consideration since 2018,<sup>33</sup> when NTIA was directed to evaluate “spectrum-sharing tools and techniques that increase spectrum access, efficiency, and effectiveness.”<sup>34</sup> And just recently, in December 2023, the International Telecommunication Union World Radiocommunication Conference 2023 recommended further technical studies of the band for International Mobile Telecommunications use.<sup>35</sup> Accordingly, NTIA should take the necessary next step of studying the full band and enabling its use promptly to solidify the U.S.’s role as a global spectrum policy leader.

As Comcast highlighted in its comments on the Strategy, an unlicensed model is ideal for coexistence in the Lower 7 GHz band given its adjacency to the 5.975-7.125 GHz (“6 GHz”)

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<sup>32</sup> NSS at 2.

<sup>33</sup> See NTIA Aug. 1, 2019 Memorandum.

<sup>34</sup> 2018 Presidential Memorandum.

<sup>35</sup> See International Telecommunication Union (ITU), Provisional Final Acts WRC-23 (2023), at 611-613, [https://www.itu.int/dms\\_pub/itu-r/opb/act/R-ACT-WRC.15-2023-PDF-E.pdf](https://www.itu.int/dms_pub/itu-r/opb/act/R-ACT-WRC.15-2023-PDF-E.pdf).

band, which is already allocated for unlicensed use.<sup>36</sup> The Lower 7 GHz band contains federal point-to-point microwave operations with similar characteristics to non-federal point-to-point links in the 6 GHz band. The mitigation techniques used in the 6 GHz band to enable coexistence can therefore be effectively extended on an expedited basis to protect similar incumbent uses in the Lower 7 GHz band to likewise make it available on an unlicensed basis. Additionally, extending unlicensed use to the Lower 7 GHz band would complete a stranded 320-megahertz channel that can be used by the next-generation of Wi-Fi (Wi-Fi 7). This channel is already recognized by the IEEE standard, but the FCC’s 6 GHz Report and Order left the channel incomplete because the proceeding did not consider Federal-use bands. Those wider channel blocks are critical to realizing the full potential of Wi-Fi 7, as they support faster speeds, higher throughput, lower latency, and greater capacity needed for increasingly data-intensive applications. Moreover, the 7/8 GHz band is internationally harmonized, and extending unlicensed use of the 6 GHz band to the Lower 7 GHz band would therefore benefit consumers by enabling companies to achieve economies on a global scale.

NTIA and FCC action to make the Lower 7 GHz band available for unlicensed use can occur quickly, while still enabling NTIA to also analyze the remainder of the band for additional unlicensed and shared use. The FCC’s Technological Advisory Council (“TAC”) recently published a report marking the 7/8 GHz band in its list of potential spectrum ranges suitable for coexistence.<sup>37</sup> Thus, with respect to the remainder of the band, any further inquiry should build upon the conclusions in the FCC’s TAC report and leverage the findings from other existing

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<sup>36</sup> See Comments of Comcast Corporation, Development of a National Spectrum Strategy, NTIA-2023-0003-0001, at 16-17 (Apr. 17, 2023).

<sup>37</sup> See *A Preliminary View of Spectrum Bands in the 7.125-24 GHz Range; and a Summary of Spectrum Sharing Frameworks*, Federal Communications Commission Technological Advisory Council Advanced Spectrum Sharing Working Group, at 27 (Aug. 17, 2023), <https://www.fcc.gov/sites/default/files/SpectrumSharingReportforTAC%20%28updated%29.pdf>.

studies and real-world deployments demonstrating the viability of coexistence models, including unlicensed and shared-licensed frameworks, in this band. As with the Lower 3 GHz band, to the extent further research is needed to evaluate the 7/8 GHz band, NTIA should consider input from interested stakeholders, consistent with the Strategy.

**C. NTIA and the FCC Should Act Promptly To Make the Lower 37 GHz Band Available on a Coexistence Basis.**

The Lower 37 GHz band has likewise been subject to extensive review and stakeholder input, including an ongoing FCC rulemaking proceeding designating the Lower 37 GHz portion for coordinated co-primary shared access between Federal and non-Federal users. NTIA and the FCC should take the necessary next steps to finalize making the band available for commercial use on a coexistence basis. As with the Lower 3 GHz and Lower 7 GHz bands, any further study should be expedited and targeted to further refinements on implementing a coexistence framework.

The Lower 37 GHz band offers tremendous potential. The Lower 37 GHz band is particularly well suited for shared use because it presents minimal incumbency issues. As the FCC has previously explained, Lower 37 GHz is a “greenfield” band, meaning that there are no existing non-federal operations, terrestrial or mobile.<sup>38</sup> And the Federal fixed and mobile service allocations also have been lightly utilized.<sup>39</sup> Technical studies submitted in the FCC proceeding have confirmed the feasibility of coexistence with federal incumbents in the Lower 37 GHz band,<sup>40</sup> including a 2021 Quadra Partners study, which demonstrated that multiple networks can

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<sup>38</sup> See Lower 37 GHz NOI ¶ 101.

<sup>39</sup> See *id.*

<sup>40</sup> See Lower 37 GHz Study (2021), attached to Letter from Colleen King, Vice President, Regulatory Affairs, Charter, to Marlene H. Dortch, Sec’y, FCC, GN Docket No. 14-177, at 1-2 (Apr. 21, 2023) (“Lower 37 GHz Study”) (demonstrating examples of coexistence sharing scenarios between commercial and Federal users).

share the band and operate in the same geographic area if they use TDD synchronization.<sup>41</sup>

Moreover, Lower 37 GHz-compatible equipment has been tested and is ready for market because of equipment-interoperability requirements with spectrum already auctioned in the upper portion of the band.<sup>42</sup>

As NTIA and the FCC work to finalize coexistence in the band, the FCC should adopt a nationwide, non-exclusive licensing approach with technical rules that promote flexibility and opportunities for experimentation and innovation. Given the propagation characteristics of the band, which require the use of highly focused beams, technical studies examining expanded use have found that coexistence among multiple networks in the same geographic areas would be feasible and that TDD synchronization would only be required in certain co-channel cases.<sup>43</sup> Given that the Lower 37 GHz band is straightforward for supporting coexistence frameworks, this light-touch regulatory regime would enable immediate and intensive use of the band.<sup>44</sup>

In light of the existing equipment ecosystem, longstanding industry interest in the band, and determinations by the FCC, the band is poised to support commercial operations rapidly through a nationwide, non-exclusive shared-licensing framework. Any further NTIA study should build upon the work that has already been done, including by the FCC, and NTIA must continue to consider input from interested stakeholders, consistent with the Strategy.

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<sup>41</sup> *See id.* at 8.

<sup>42</sup> *See id.* at 4.

<sup>43</sup> *See* Lower 37 GHz Study at 8.

<sup>44</sup> *See* Comments of NCTA—The Internet & Television Association, Shared Use of the 42-42.5 GHz Band, Use of Spectrum Bands Above 24 GHz For Mobile Radio Services, WT Docket No. 23-319, at 6-12 (Oct. 23, 2023).

**II. THE IMPLEMENTATION PLAN SHOULD INCLUDE CLEAR BENCHMARKS IN ORDER TO MINIMIZE DELAYS AND PROMOTE PROMPT ACCESS TO SPECTRUM, ESPECIALLY IN THE LOWER 3 GHZ, 7/8 GHZ, AND LOWER 37 GHZ BANDS.**

In order to facilitate clear execution of the Strategy, the Implementation Plan should outline concrete steps to minimize delays and prioritize commercial and Federal users' prompt access to spectrum, particularly in the Lower 3 GHz, 7/8 GHz, and Lower 37 GHz bands.

Specifically, NTIA should conduct any necessary further review of the Lower 3 GHz, 7/8 GHz, and Lower 37 GHz bands simultaneously and establish clear deadlines, with the goal of completing all further study within the next one to two years.

Indeed, this approach is consistent with the directive to develop an Implementation Plan that includes details regarding “timelines to achieve specific outcomes associated with each strategic objective.”<sup>45</sup> As previously explained, these bands have been under consideration for numerous years. Research has been conducted and the viability of repurposing these bands has long been established. Moreover, commercial deployments cannot begin until other activities, such as regulatory action, product development, certification testing, and commercial implementation, are complete. Past experience has demonstrated that these other activities needed to enable commercial deployments take significant time and cannot commence until ambiguities regarding sharing and coexistence are resolved. NTIA must factor the timing of these other activities into its overall Implementation Plan timeline. Reviewing the bands simultaneously, setting clear deadlines for agencies and all other stakeholders, and completing all further study within an expedited one- to two-year timeframe is imperative to supporting the critical next step of enabling expanded use and facilitating prompt access to spectrum.

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<sup>45</sup> NSS at 2.

Comcast also appreciates that implementation of the Strategy will require significant NTIA resources, and NTIA should be prepared to devote necessary agency resources for such review. In preparation of the Implementation Plan, NTIA should identify the resources needed to complete its review on an accelerated basis, as well anticipate any issues it may face in obtaining these resources.

### CONCLUSION

Comcast appreciates the opportunity to provide input on NTIA's Notice. Comcast urges NTIA to act quickly and decisively to leverage the existing studies that have already been conducted on the Lower 3 GHz, 7/8 GHz, and Lower 37 GHz bands and coordinate with the FCC to take prompt action to enable coexistence with commercial users, and the Implementation Plan should outline clear next steps and necessary inputs for action on an accelerated basis.

Respectfully submitted,

/s/

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